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| APPLICATION NO.               | FILING DATE    | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-------------------------------|----------------|----------------------|---------------------|------------------|
| 09/435,657                    | 11/08/1999     | JOHN L. TOMICH       | 19447-P001CI        | 5515             |
| . 7.                          | 590 08/25/2004 |                      | EXAM                | INER             |
| JACKSON W                     | ALKER LLP      |                      | JONES, PRENELL P    |                  |
| 2435 NORTH CENTRAL EXPRESSWAY |                | VAY /                |                     |                  |
| SUITE 600                     |                |                      | ART UNIT            | PAPER NUMBER     |
| RICHARDSON, TX 75080          |                |                      | 2667                |                  |

DATE MAILED: 08/25/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

| _  |  |  |  |  |  |
|--|--|--|--|--|--|
|  | Application No.  | Applicant(s)   |  |  |  |
|  | 09/435,657   | TOMICH ET AL.  |  |  |  |
| Office Action Summary  | Examiner   | Art Unit   |  |  |  |
|  | Prenell P Jones  | 2667   |  |  |  |
| The MAILING DATE of this communication app<br>Period for Reply   | pears on the cover sheet with the o  | correspondence address   |  |  |  |
| A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period v - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | 36(a). In no event, however, may a reply be ting within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE | nely filed<br>/s will be considered timely.<br>I the mailing date of this communication.<br>D (35 U.S.C. § 133). |  |  |  |
| Status   |  |  |  |  |  |
| <ul> <li>1) ☐ Responsive to communication(s) filed on 10 July</li> <li>2a) ☐ This action is FINAL. 2b) ☐ This</li> <li>3) ☐ Since this application is in condition for alloware closed in accordance with the practice under Exercise.</li> </ul>  | action is non-final.  nce except for formal matters, pro   |  |  |  |  |
| Disposition of Claims  |  |  |  |  |  |
| 4) ☐ Claim(s) 1-62 is/are pending in the application. 4a) Of the above claim(s) 1-15, 29-43,62 is/are 5) ☐ Claim(s) 16-28 and 44-54 is/are allowed. 6) ☐ Claim(s) 55 and 60 is/are rejected. 7) ☐ Claim(s) 56-59 is/are objected to. 8) ☐ Claim(s) are subject to restriction and/o  | withdrawn from consideration.  |  |  |  |  |
| 9) The specification is objected to by the Examine   | er.  |  |  |  |  |
| 10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.   |  |  |  |  |  |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  |  |  |  |  |  |
| Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.   |  |  |  |  |  |
| Priority under 35 U.S.C. § 119   |  |  |  |  |  |
| 12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:  1. Certified copies of the priority document:  2. Certified copies of the priority document:  3. Copies of the certified copies of the priority document:  application from the International Bureau  * See the attached detailed Office action for a list   | s have been received.<br>s have been received in Applicat<br>rity documents have been receive<br>u (PCT Rule 17.2(a)).   | ion No<br>ed in this National Stage  |  |  |  |
|  |  |  |  |  |  |
| Attachment(s)  |  |  |  |  |  |
| 1) Notice of References Cited (PTO-892)  | 4) Interview Summary   |  |  |  |  |
| <ol> <li>Notice of Draftsperson's Patent Drawing Review (PTO-948)</li> <li>Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)</li> <li>Paper No(s)/Mail Date</li> </ol>   | Paper No(s)/Mail D 5)  Notice of Informal F 6)  Other:   | Patent Application (PTO-152)   |  |  |  |

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### Response to Arguments

1. Applicant's arguments with respect to claims 16-28 and 44-61 have been considered but are most in view of the new ground(s) of rejection.

Examiner acknowledges Applicants claim that the present application properly claims the benefit of the February 29, 1996 filing date.

Applicant is reminded that all non-elected claims from previous office action are required to be cancelled before application is allowed.

### Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 3. Claims 55 and 60 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lakhani in view of Hwang.

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Regarding claim 55 and 60, Lakhani discloses (Abstract, Fig. 2, col. 2, line 2-45) a CATV multimedia workstation network wherein the architecture is includes a plurality of workstations (settop units/terminals) that are interconnected via a ring-configuration, the computer workstations decode demodulated signals into picture, audio and data signals, (col. 4, line 9-63, col. 5, line 15-67) networks exist on the same looped cable (multi-access channel), workstations include peripheral devices and there associated interfaces (printers, mouse, keyboard and etc..), a central control center comprising of microcomputer (micro-controller) whereby the control center may include storage with a minicomputer system, and cable ring associated with frequency band segments. Lakhani is silent on each workstation containing a micro-controller in a CATV environment. In analogous art, Hwang discloses (Abstract, col. 8, line 31-67) a CATV environment, multi-media on-demand work group, iTVpanel that consist of a PC-based or microcontroller-based set-top box and that interfaces host processor via attached devices (peripherals), (col. 9, line 22 thru col. 10, line 46, col. 19, line 5-40) cable segments, and a plurality C-iTVpanels (set-top box). Therefore, it would have been obvious to one of ordinary skill in the arts at the time of the invention to be motivated to implement a micro-controller with each set-top box as taught by Hwang in his CATV environment with the teachings of Lakhani for the purpose of allowing each workstation/set-top box the ability to control its workstation routing and obtaining services without the stress of a central control center that handles the monitoring of all workstations/set-top boxes.

#### Allowable Subject Matter

4. Claims 16-28, 44-54 and 61 are allowed over prior art.

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- 5. Claims 56-59 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- The following is a statement of reasons for the indication of allowable subject matter: 6. Although the prior art discloses a multimedia super-ring architecture of a plurality of set-top boxes/terminals, wherein peripheral devices are coupled to the ring architecture coupled with a multi-access channel, interface device for plurality of video peripherals, multiple users access to a PC-based server in a home local area network using conventional TVs as display and set-top box as an interface between the TV and the network, plurality of set-top boxes, wherein the architecture includes a micro-controller, which controls a set-top box and the micro-controller includes memory, an introduction of micro-controllers for providing communication between peripheral devices and system control processor, freeing the system control processor to perform other task as to improve the system performance, system accommodates multimedia communications they fail to teach/suggest photonic network that includes a program executed by the set-top box micro-controller, adapted to route the data bandwidth segments according to a software subscription table stored in memory, head-end circuit adapted to format bandwidth segments into a signal transmittable via a wide-signal bandwidth, wherein a channel selection register adapted to designate a core television channel selection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Prenell P. Jones whose telephone number is 703-305-0630. The examiner can normally be reached on 9:00-5:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chi Pham can be reached on 703-305-4378. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306 and (571) 273-3180.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Prenell P. Jones

August 20, 2004\

KWANG BIN YAO

PRIMARY EXAMINER

# Attachment for PTO-948 (Rev. 03/01, or earlier) 6/18/01

The below text replaces the pre-printed text under the heading, "Information on How to Effect Drawing Changes," on the back of the PTO-948 (Rev. 03/01, or earlier) form.

## INFORMATION ON HOW TO EFFECT DRAWING CHANGES

### 1. Correction of Informalities -- 37 CFR 1.85

New corrected drawings must be filed with the changes incorporated therein Identifying indicia, if provided, should include the title of the invention, inventor's name, and application number, or docket number (if any) if an application number has not been assigned to the application. If this information is provided, it must be placed on the front of each sheet and centered within the top margin. If corrected drawings are required in a Notice of Allowability (PTOL-37), the new drawings MUST be filed within the THREE MONTH shortened statutory period set for reply in the Notice of Allowability. Extensions of time may NOT be obtained under the provisions of 37 CFR 1.136(a) or (b) for filing the corrected drawings after the mailing of a Notice of Allowability. The drawings should be filed as a separate paper with a transmittal letter addressed to the Official Draftsperson.

2. Corrections other than Informalities Noted by Draftsperson on form PTO-948.

All changes to the drawings, other than informalities noted by the Draftsperson. MUST be made in the same manner as above except that, normally, a highlighted (preferably red ink) sketch of the changes to be incorporated into the new drawings MUST be approved by the examiner before the application will be allowed. No changes will be permitted to be made, other than correction of informalities, unless the examiner has approved the proposed changes

## Timing of Corrections

Applicant is required to submit the drawing corrections within the time period set in the attached Office communication. See 37 CFR 1.85(a).

Failure to take corrective action within the set period will result in ABANDONMENT of the application.